Amendments to the Claims

This listing of claims replaces, without prejudice, all prior versions and listings of claims in the application:

1. (Previously presented) A radial flow cartridge for treating a fluid, the cartridge comprising:

an inner tubular cage having a plurality of openings formed in it to permit passage of a fluid;

an outer tubular cage having a plurality of openings formed in it to permit passage of a fluid, the outer cage being disposed about the inner cage;

a non-rigid tubular liner permeable to a fluid, located between the inner and outer cages and spaced apart from the outer cage; and

an expandable fluid treatment medium contained between the inner cage and the liner.

2. (Canceled)

3. (Original) The cartridge according to claim 1, wherein the liner is elastic.

4. (Original) The cartridge according to claim 1, wherein the liner is made of a woven material that permits radial expansion.

5. (Original) The cartridge according to claim 1, wherein a portion of the liner is radially restrained.

6. (Original) The cartridge according to claim 1, wherein the liner is spaced from the outer cage by at least one circumferential band that inhibits radial expansion of a portion of the liner.

7. (Currently amended) The cartridge according to claim [[6]] 1, wherein the band is elastic.

8. (Currently amended) The cartridge according to claim [[6]] 1, wherein the band is made of a woven material that permits radial expansion.

9. (Original) The cartridge according to claim 6, wherein the band is substantially inelastic, and wherein the medium may expand by expanding the liner to either side of the at least one band.

10. (Original) The cartridge according to claim 1, wherein the liner is spaced from the outer cage by one or more radial spacers extending from the liner to the outer cage.

11. (Original) The cartridge according to claim 10, wherein the one or more spacers are in the form of an annular disk.

12. (Original) The cartridge according to claim 10, wherein the one or more spacers include flanges that engage with the liner.

13. (Currently amended) The cartridge according to claim [[2]] 1, where the amount of medium is selected such that at its maximum expansion expected to occur in use the medium substantially fills the volume between the inner and outer cages.

14. (Previously presented) The cartridge according to claim 1, wherein the ends of the cartridge between the inner and outer cages are closed, the arrangement designed to cause fluid to flow radially between the inner cage and the outer cage.

15. (Previously presented) The cartridge according to claim 1, wherein the medium substantially fills the space between the liner and the inner cage.

16. (Previously presented) The cartridge according to claim 1, wherein said medium is an ion exchange resin.

17. (Previously presented) A method of making a radial flow cartridge, comprising:

providing a cartridge that has inner and outer fluid permeable tubular cages and a non-rigid fluid permeable tubular liner extending the length of the cartridge between the inner and outer cages and spaced apart from the outer cage;

providing a fluid treatment medium for use in the cartridge, which medium tends to expand and/or contract in use; and

introducing the medium into the space between the liner and the inner cage.

18. (Original) The method according to claim 17, wherein the liner is elastic, and wherein the method comprises the step of restricting the radial expansion of a portion of the liner.

19. (Original) The method according to claim 17, further comprising the step of placing at least one circumferential band around the outside of the liner, the radial band restricting radial expansion of a portion of the liner.

20. (Original) The method according to claim 17, further comprising the step of spacing the liner from the outer cage by one or more radial spacers which extend between the liner and the outer cage.

21. (Original) The method according to claim 17, further comprising the step of introducing into the cartridge a quantity of the medium that at its maximum anticipated expansion during use substantially fills the volume between the inner and outer cages.

22. (Original) The method according to claim 17, further comprising the step of substantially filling the space between the liner and the inner cage with the medium.

23. (Previously presented) A radial flow cartridge to treat a fluid, the cartridge comprising:

an inner tubular cage having a plurality of openings formed in it to permit passage of a fluid, the inner cage having first and second axial ends;

an outer tubular cage having a plurality of openings formed in it to permit passage of a fluid, the inner cage having first and second axial ends, the outer cage being disposed about and spaced apart from the inner cage;

a first lid attached to the inner and outer cages so as to close off the space between first axial ends of the inner and outer cages;

a second lid attached to the inner and outer cages so as to close off the space between second axial ends of the inner and outer cages;

a non-rigid tubular liner located between the inner and outer cages and spaced apart from the outer cage, the liner being permeable to at least one fluid; and

a fluid treatment medium disposed between the liner and the inner cage, the medium adapted to expand upon absorption of fluid, wherein the liner is adapted to deform upon expansion of the medium so as to permit the medium to expand radially toward the outer cage.

24. (Original) The cartridge according to claim 23, wherein the liner is made of a woven material that permits radial expansion.

25. (Original) The cartridge according to claim 24, wherein the woven material is a knit polyester.

26. (Original) The cartridge according to claim 23, wherein the liner has axial ends that are attached between the outer cage and the lid.